

Nathan Moody of Los Alamos National Laboratory to share in 2021 IEEE particle accelerator award

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LOS ALAMOS, N.M., Sept. 24, 2020—Nathan Moody of Los Alamos National Laboratory is a co-winner of the Institute of Electrical and Electronics Engineers (IEEE) Nuclear and Plasma Sciences Society (NPSS) 2021 Particle Accelerator Science and Technology (PAST) Award.

"We're very excited about Nathan Moody's recognition with the 2021 PAST Award, which is testament to his leadership, and Nathan's and his colleagues' technical achievements," said John Sarrao, deputy director for Science, Technology, and Engineering at Los Alamos. "We also look forward to watching his future accomplishments on behalf of the Laboratory and the accelerator community."

Moody shares the award with Xijie Wang of SLAC National Accelerator Laboratory.

Moody was cited for "deep and broad contributions to accelerator science and technology, especially multi-disciplinary photocathode science." Wang's citation is for "contributions to the development of high brightness, ultrafast electron beams and their applications to free-electron lasers and ultrafast electron diffraction."

Moody is the group leader for Accelerators and Electrodynamics at Los Alamos. He came to the Lab after receiving his Ph.D. in electrical engineering from the University of Maryland, where he focused on self-healing photocathodes. He expanded this work at Los Alamos, which has led to the development of the Applied Cathode Engineering and Robustness Technology (ACERT) facility.

The ACERT effort has generated numerous patents and was instrumental in winning a highly prestigious R&D 100 award in 2019 for Atomic Armor – a versatile application method of graphene that is an example of how a materials-centric approach to accelerator problems can lead to breakthroughs beneficial to many other fields.

He has served in the local IEEE section as the NPSS chapter chair for three years and has been involved in science, technology, engineering, and mathematics education outreach as a staff scientist mentor in the local community.

The PAST Award is sponsored by the Particle Accelerator Science and Technology Technical Committee of the IEEE Nuclear and Plasma Sciences Society. Details on the award and the previous recipients can be found on the Society's website.

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